

Summary of Scoping Comments

Olympic Pipeline Cross Cascade Pipeline Project

1 SUMMARY OF PRIMARY ISSUES

A total of 92 comment letters were received and reviewed for this summary. Oral testimony presented at six meetings is summarized as well. A summary of the primary issues raised in written comments is followed by a description of the methodology used and then the categories and tabulations of the issues that were raised.

1.1 Primary and Secondary Issues

This summary lists the primary and secondary issues of concern, which are provided in more detail in Section 2. The primary issues of concern are those issues identified 20 or more times by commentors. The secondary issues of concern are those issues identified 10 to 19 times.

Primary Issues:

- Additional information is needed about the project location, design, construction methods, and operation (23)
- Evaluate expanding existing modes of transporting petroleum products (36) and new alternatives (27)
- Evaluate in detail sizes of spills; detection methods; potential risks from spills, fires, explosions (50)
- Impacts to streams and rivers (38), other surface waters (23), other surface water quality (20), wetlands (22), groundwater and sole source aquifers (38), vegetation and habitat (20), and socioeconomics (28)

Secondary Issues:

- A clear and concise statement of Purpose and Need is needed (12)
- Comparatively evaluate frequency and volume of spills from barges, trucks, and pipelines (15)

- Evaluate spill prevention measures (14), spill response/remediation measures (14), and prepare appropriate plans (12)
- More information is needed about soils (11), groundwater and sole source aquifers (10)
- Impacts on soil erosion and mass movements (19), sensitive seismic/geological areas (17), fish (19), wildlife (18), threatened and endangered species (11), air quality (16), noise (12), compatibility with land uses/regulations (17), transportation and traffic (15), aesthetics (12), recreation (10), agriculture (19)
- Provide details about mitigation measures for stream/river crossings (11), groundwater and sole source aquifers (13)

1.2 Summarization Methodology

Comments were summarized by issue category, generally established to be comparable to major disciplines that will be evaluated in the environmental impact statement. Subcategories of issues were established for the affected environment, additional description needed for construction and operation techniques as they affect that issue category, methods that should be used, analyses of impacts, descriptions of mitigation measures, and any other required plans or permits.

Each letter was reviewed to identify the major issues, and issue categories and subcategories were expanded to include various facets of an issue (e.g., specific requests for additional information about variables for an issue). A running tabulation was kept, indicated in parentheses after each issue subcategory, so that the frequency and importance of the issue could be summarized. If more than one comment was made in a letter about the impacts for a subcategory of an issue, for instance several different types of impacts to streams, only one tabulation was given to that subcategory issue. If a comment was made only once, no number follows it.

If duplicate letters were received from one commentor, only one of the letters was tabulated. If a single commentor submitted more than one letter that was either on a different date or in a different format, each letter was tabulated. If a comment form was submitted requesting inclusion on the mailing list or otherwise did not include a comment, it was not tabulated.

2 CATEGORIZED SUMMARY OF COMMENTS

2.1 Completeness of Application, Information, Studies, and Analyses

- Significant portions of the proposed pipeline route and alternatives (e.g., Stampede Pass) have not been finalized (6)

- Detailed information is needed about actual project analysis area, construction corridor widths, trench depth, and trench dimensions along the pipeline route; ability to stay within existing rights-of-way; provide a map of the existing corridors and OPL's corridor within them; location of all existing and proposed facilities; location of staging areas and construction yards; drainage facilities; location of utilities; construction methods; conflicts with other linear facilities (fiber optics lines); project design, technical studies, and engineering (cathodic protection); burying the pipeline at least four feet below bottom of stream bed; availability of right-of-way and extent of impacts on the John Wayne Pioneer Trail, other park lands, and Yakima Training Center; anticipated life of the project; the QA/QC measures used during construction and operation; operation and maintenance activities along the right-of-way and at facilities; adequacy of six employees to monitor pipeline; the process for abandonment or termination of the project; greatest operating pressure and temperature of the pipeline; feasibility of a double-wall pipeline; use and storage of topsoil (23)
- Not all public landowners have been contacted to obtain options or easements to cross their property, and not all easements have been obtained (7)
- Need to analyze the locations and frequency of placement of block valves, check valves, and trench plugs (6)
- Evaluate the project schedule, including a more realistic start date, time for conducting additional studies, concerns about the permitting process, avoiding low-flow periods and sensitive fish periods
- Identify the types and quality of available resource information as well as data gaps and needs (4)
- Provide more detail about the financial assurances, liability and property damage insurance, and workman's compensation that is to be provided to address damages from the project or abandonment; indemnify landowners against financial losses from spills or other damages (4)

2.2 Purpose and Need

- Provide a clear and concise statement of the Purpose and Need to support selection of the alternatives and comparison to the no action alternative (12)
- Will the proposed pipeline redirect the existing supply of petroleum products by a different mode of transportation or will it lead to an increase in the amount of product being transported? (4)
- Evaluate the current, near future, and distant future (50 years) demand for products in eastern Washington with supplies (9)

2.3 Alternatives Analysis

- Evaluate in detail (construction and operational direct and indirect impacts; avoided, minimized, mitigated, and unavoidable impacts) and comparatively the no action alternative and expansion of use of existing petroleum product delivery methods (Portland pipeline and barging, barging alone, trucking), conservation, alternative energy sources (36)
- Evaluate in detail (construction and operational direct and indirect impacts; avoided, minimized, mitigated, and unavoidable impacts) and comparatively the alternative petroleum product delivery methods (other existing pipelines, other potential pipeline routes, rail), alternative pump station and tank farm locations (27)
- Evaluate the need to place the pipeline in the John Wayne Pioneer Trail corridor versus other viable alternate routes (2)
- What is the basis for assuming that barge transportation will be greatly reduced? Is the decrease based solely upon a cost comparison? What assumptions underlie the cost comparison between the pipeline and barging? Will changes in these assumptions impact the cost comparison? If transporting oil through the pipeline were closer in cost to barging, would it affect barge traffic? Will the pipeline displace barge transport of oil products (to what extent and for how long)?
- Evaluate in detail and comparatively the additional delivery of oil products from pipelines located east of Pasco, future plans for Utah refineries, ability of Canadian fuel supplies to meet eastern Washington's needs, proposed new pipelines from outside of eastern Washington, and ability to get oil from Canada to eastern Washington without marine transport (5)
- Provide population data, economic data, and safety records to support the selection of specific alternatives to be evaluated in the EIS (2)

2.4 Oil Export

- Will this project make it possible to supply petroleum products beyond Washington boundaries, such as Montana or Utah? (6)
- If petroleum products are transported to Montana or Salt Lake City by the pipeline would barges still be required to meet the eastern Washington demand? (3)

2.5 Risk Analysis and Spill Prevention

- Evaluate in detail the potential risk of pipeline failure, leakage detection limits, maximum release quantity, notification and response time, delivery pathways to sensitive ecosystems, spills from refueling equipment, fires, explosions and diameter of blast, risk of locating pipeline for flammable substances near power lines, notification of local landowners about leaks (50)
- Evaluate the frequency and volume of spills regionally and nationally between barges, trucks, and pipelines; include worst-case scenarios, use of Best Achievable Protection (15)
- Conduct a risk analysis of potential damages (vandalism, terrorism, vehicles, rockfalls) and subsequent spill potential of the pipeline route through the Snoqualmie Tunnel, particularly where it emerges from underground to above ground; or generally from terrorist/vandal attacks on above-ground facilities, falling trees (9)
- Evaluate, comparatively, standard construction and operational spill prevention measures and technology for all related facilities for barges and pipelines (pipeline, secondary piping, tanks, secondary containment areas), including third- party damage control, build specifications and testing of structures and materials used, corrosion control, instrumentation, controls, valve and pump operation, inspection and maintenance, monitoring, reliability of oil penetrant testing method for tanks, frequency of inspections and effects of weather on conducting them (14)
- Evaluate, comparatively, standard spill response measures, remediation activities, response timeframes, equipment, contractors, and liability for barges and pipelines (14)
- Prepare spill prevention, control, and countermeasure plan; monitoring plan; security and maintenance plan; oil spill response plan/emergency response procedures (12)

2.6 Soils and Topography

- Detailed, site-specific geological information is needed for the entire route, including topography, surficial geology, soils, stream substrates, sediments, rates of erosion, landform stability, mass wasting hazards (shifting and slides), liquefaction of soils in roads, maps of high erosion and mass wasting hazards (11)
- Evaluate in detail timing of construction; levels of impacts for mass soil movement and particularly for steep slopes; instability of soils; soil erosion; foundation studies are needed (19)
- Evaluate impacts of slope failures and mudflows resulting from irrigation canals (KRD canal) and near rivers (Yakima River) on the pipeline; the Corfu landslide (2)

- Evaluate in detail erosion control mitigation measures, slope failure measures and reclamation, incorporating prescriptions from watershed analyses (9)

2.7 Geology and Seismicity

- Detailed, site-specific geological information is needed for the entire route using the wide variety of published reports that are available and more accurate than the cited sources, including the number and location of all faults (active, potentially active, and inactive), seismic instability/earth movements, fractured rock zones, the criteria for designation of active faults, the criteria for seismic risk assessment, causes of mass movement hazards (8)
- More geologic information is needed to evaluate the feasibility of drilling under the Columbia River, and for areas near Keechelus, Kachess, and Cle Elum Dams; include detailed location and depth of drilling (3)
- Evaluate in detail design considerations if locating facilities in sensitive geologic areas; levels of impacts (17)
- Describe potential mitigation measures for earthquake damage to the pipeline, to stabilize mass movement hazards (3)

2.8 Streams and Crossings

- Detailed, site-specific information is needed about the location of each stream crossing, including plan and cross section drawings of stream banks and riparian areas, elevations, depth of crossings; site stability (of banks, riparian, and stream bed); physical, chemical, and biological characteristics; sediment transport; hydrology; geomorphology; interconnections between streams, wetlands, and groundwater systems; use state stream classifications rather than USFS (7)
- Detailed, site-specific information and impact analysis are needed about alternative construction methods; timing of construction (month by month for each stream); potential loss or alteration of hydrological connections; increased channel and bank instability/erosion; shifts in the location of river channels; reduced flood storage capability; impacts to the pipeline from flooding and scouring; impacts from turbidity and sedimentation; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes; compliance with water quality standards; movement of spill contaminants through the water column; permits for all permanent and seasonal creeks (38)

- Evaluate, comparatively, the positive impacts of reduced chances of emissions into rivers from fuel spills because of the pipeline rather than barging; reduced indirect impacts from potential releases to dock and boat facilities needed to support barging (4)
- Stream crossings are to occur during the summer low-flow periods; however, the Yakima River is regulated for irrigation and has its greatest flows during June-August
- Evaluate the use of a second outer sheath of pipe for spill protection under sensitive rivers such as the Columbia River
- Details need to be provided about mitigation measures for stream crossings, including revegetation measures, erosion control, additional spill prevention or detection measures proposed for pipeline sections running near or under streams/rivers (11)

2.9 Other Surface Water Sources/Quality

- Detailed, site-specific information is needed about lakes and other surface water bodies, including physical, chemical, and biological characteristics; waterbodies with impaired uses; potentially affected watersheds (identify on maps); watershed sensitivity; floodplain levels or changes in assessed levels based upon recent flooding (for 5, 50, 100, and 500-year floods); flood boundaries (show on maps); verification of established water rights (6)
- Detailed, site-specific information is needed about baseline water quality; assimilation capability of surface waters; relationship between surface water quality and biota (2)
- More information is needed about the pipeline route through the Seattle Cedar River and Tacoma Green River watersheds, how they would be affected, and how other landowners in these watersheds would be affected
- Conduct an antidegradation analysis
- Detailed, site-specific information is needed about impacts on potential increased surface water runoff, seasonal effects of increased runoff and timing of construction, impacts on watersheds, impacts on floodplains, impacts to pipeline from flooding (23)
- Detailed, site-specific information is needed about impacts on surface water quality (sedimentation); delivery mechanisms of contaminants to surface water; contamination from accidental releases; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes; compliance with water quality standards; hydrostatic water discharges (amount, timing, and quality) (20)

- Describe mitigation measures for water quality, including best management practices for stormwater runoff, do not use wetlands for stormwater detention, remediation costs (8)
- Prepare a stormwater pollution prevention plan (2)

2.10 Wetlands

- All wetlands have not been identified (2)
- Detailed, site-specific information needs to be provided about wetlands, including physical, chemical, and biological characteristics; rare or unique habitats; associated wetlands under the Shoreline Management Act; hydraulic continuity of wetlands; wetlands must be delineated; provide detailed maps (7)
- Delineate wetlands using the Corps 1987 Manual, conduct a wetlands assessment to determine ecosystem and landscape-scale functions
- Detailed, site-specific information needs to be provided about impacts to wetlands, including duration and rate of recovery; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes; indirect wetland impacts from other water crossings/trenchings; how wetlands will be accessed if a break occurs if access roads are not built through wetlands (22)
- Detailed, site-specific information needs to be provided about mitigation measures (avoidance and restoration), including those specified for roads (see below), use of best management practices, when and where mitigation would occur (9)
- Damaged wetlands are very difficult to repair or replace, provide examples of successful mitigation (3)
- Provide a detailed compensatory mitigation plan, monitoring plan, contingency plan (2)

2.11 Groundwater Sources/Quality

- Detailed, site-specific information is needed about location and depth of sole source aquifers and aquifer discharge areas; aquifer recharge areas, rates, conditions, functions; map the aquifers; wellhead protection areas; permeability of overlying soils; sources of public water (City of Carnation, Water District #119), other groundwater resources; verification of established water rights (10)
- Detailed, site-specific information is needed about baseline water quality (2)

- Conduct an antidegradation analysis
- Detailed, site-specific information is needed about impacts on loss of groundwater recharge and discharge areas, dewatering (5)
- Detailed, site-specific information is needed about impacts on sole source aquifers (Cross Valley); impacts to wells; groundwater quality; delivery mechanisms of contaminants to groundwater; contamination from accidental releases; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes (38)
- Describe mitigation measures for water quality impacts, including additional prevention/protection or detection measures proposed near or over sole source aquifers; other sources of water available if contamination occurs; compensation for contaminated aquifers/wells (13)
- Prepare a groundwater monitoring/mitigation plan, inspection plan (4)

2.12 Vegetation/Habitat

- Detailed, site-specific information needs to be provided about habitat, use the USFS Yakima data layers (3)
- Conduct a rare-plant survey
- Evaluate, in detail, impacts from habitat loss including going beyond the existing rights-of-way; short- and long-term impacts to riparian areas; duration of impacts; rate of recovery; shoreline disturbance zones; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes; efforts to preserve natural vegetation; impacts on rare plant species; loss of cedar and other trees in residential areas; disposal of cleared vegetation (20)
- Detailed, site-specific information needs to be provided about mitigation measures, including reforestation, reseeding, and weed control (9)
- High quality sage steppe is a priority habitat, fragile, and difficult to establish
- Prepare a detailed monitoring and mitigation plan for upland vegetation with the application, a revegetation plan (2)

2.13 Fish

- Detailed, site-specific information is needed about fish species (salmon, trout, etc.) affected at each stream crossing, in the immediate vicinity of the crossing, and downstream of the crossing; status of each species, including whether it is wild or hatchery stock; state or federal threatened, endangered, or at risk (4)
- Discussion of fish potentially affected is incomplete, including omission of sturgeon in the Columbia, steelhead for Swauk Creek
- Evaluate in detail impacts to fish, the life stages of fish, blasting measures and their impacts on fish and mortality to fish eggs, spawning and rearing habitat, production numbers, dispersal corridors, limiting factors to aquatic community viability and full support of beneficial uses, impacts from sedimentation, impacts to fish habitat from contamination during a spill, impacts to the Yakima Fisheries Project and Enhancement Program (19)
- Discuss in detail methods for capturing, handling, and removing fish in areas to be blasted
- Describe mitigation measures for impacts to fish (3)

2.14 Wildlife

- Detailed, site-specific information is needed for all of the affected wildlife species in the vicinity; key species and populations; species at the edge of their ranges; USFWS designated "gap" habitats; life stages; quality and capacity of existing habitat; known or expected wildlife use and needs of habitat; large, undisturbed ecosystems or habitat types that add local diversity and stability (wilderness or roadless areas); location and size of wildlife corridors and trails; critical hazards or species sensitivities (7)
- The application of elk should be added to the list of large mammals common in forests
- A HEP study should be conducted, conduct studies at the watershed or larger scale, explain rationale for selection of indicator species if they are used
- Detailed, site-specific information needs to be provided about impact duration; rate of recovery from impacts; effects on productivity; critical life stages; alterations to wildlife viability; changes in overall biodiversity; effects on migration; blasting measures and their impacts on wildlife; expected effect of habitat fragmentation (loss or reduced access); effects on gene pool and species diversity; maintenance of ecosystem processes and functions; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes; effects on aircraft flights to monitor species (18)

- Detailed, site-specific information needs to be provided about mitigation measures, including maintenance or development of upland and stream wildlife dispersal corridors (3)
- Prepare a habitat management plan to address impacts on wildlife

2.15 Threatened and Endangered Species

- Detailed, site-specific information is needed for all of the affected state and federal threatened and endangered species (fish and wildlife); state at-risk species and priority habitats and species; key species and populations; life stages; quality and capacity of existing habitat; known or expected uses and needs of habitat; large, undisturbed ecosystems or habitat types that add local diversity and stability (wilderness or roadless areas); location and size of wildlife corridors and trails; critical hazards or species sensitivities (6)
- A HEP study should be conducted, conduct studies at the watershed or larger scale, explain rationale for selection of indicator species if they are used
- Detailed, site-specific information needs to be provided about impacts to endangered and threatened species; impact duration; rate of recovery from impacts; alterations to wildlife viability; changes in overall biodiversity; blasting measures and their impacts; expected effect of habitat fragmentation (loss or reduced access); effects on gene pool and species diversity; maintenance of ecosystem processes and functions; impacts from indirectly induced increased growth rates for residential, commercial, and industrial purposes (11)
- Include a Biological Assessment and the Biological Opinion or formal concurrence in the DEIS
- Detailed, site-specific information needs to be provided about mitigation measures, including maintenance or development of upland and stream wildlife dispersal corridors (3)

2.16 Air Quality

- Provide information about existing air quality conditions, designation of attainment or non-attainment, availability of air monitoring data (2)
- Evaluate impacts from the type, frequency, and amount of material to be emitted; air quality permits required; compliance with National Ambient Air Quality Standards and Prevention of Significant Deterioration increments; post-project airshed health;

cumulative increase in benzene impacts at the Kittitas facility; effectiveness of buffers for maintaining air quality; contribution to CO₂ and global warming (16)

- Evaluate, comparatively, the positive impacts of reduced air pollutants (SO_x, NO_x, CO, VOCs, particulates) of the pipeline (versus those currently generated) from avoiding the tanker, barge, and truck loading and unloading processes in northwest Washington, Portland/Vancouver, and Tri-Cities; from reduced tanker, barge, and truck operation (smokestacks and tailpipes); intermediate transfers into and out of tank farms from barges in the Portland area; reduced emissions in non-attainment areas; avoided costs of implementing Oregon DEQ RACT requirements at Portland tank farms (4)
- Provide information and comparatively evaluate air quality prevention and pollution control measures that are legally required, technologically feasible, and proposed by the applicant; air pollution monitoring and warning systems (3)
- Provide a monitoring plan, assurance that the plan will be implemented

2.17 Noise

- Detailed, site-specific information needs to be provided about existing and anticipated land uses near the facilities and their sensitivity to noise, existing noise levels, locations where regulated noise levels are already exceeded (3)
- Conduct a noise level survey to determine existing levels and as the basis for modeling impacts to nearby residences and other land uses from pump stations and the Kittitas Terminal (2)
- Provide predicted noise levels generated by the project, including actual day and night noise levels for motor vehicles and industrial equipment, distances from facilities to the nearest residences (6)
- Detailed, site-specific information needs to be provided about impacts to human, agricultural (livestock), and non-human communities (wildlife) (type, intensity, frequency, timing, effect, duration); from plane flyovers; the number of people potentially affected; number of residences and businesses receiving exceeded noise thresholds; number of residences and businesses receiving an exceedance of a 10 DBA increase (also show on a map); from removal of buffering vegetation (12)
- Detailed, site-specific information needs to be provided about mitigation measures, including noise abatement (walls, building insulation, acquisition, construction and operation windows), human and non-human communities that will not be protected through implementation of noise abatement measures, for vibration (4)

- Conduct noise monitoring studies to verify compliance of facilities once operation begins

2.18 Land Use

- Analyze and evaluate in detail compliance with federal, state, and local jurisdictional requirements (including permits); what agreements exist for using federal and state rights-of-way; the preemption process and how it relates to those requirements; compatibility with surrounding land uses and character; compliance with the GMA requirement to comply with local comprehensive plans and development regulations; need more information to determine compatibility with local land use plans and regulations; division or disruption of existing land uses; condemnation of lands (17)
- The project is in conflict with local comprehensive plans, zoning, regulations
- The pipeline route is in conflict with the designated use of the Yakima Training Center, route and depth of the pipeline are issues (2)
- Describe mitigation measures for compensating for land use review and planning expenses, details about coordination with federal agencies, specifics about how the project will be designed to be in compliance with regulations (2)

2.19 Transportation and Traffic

- Conduct a traffic study in the vicinity of the Kittitas Terminal; identify routes to be used by trucks; provide more accurate estimates about the number of trucks that will access sites (rather than a general estimate); provide more information about the quality of roads to be used, their capacity to withstand heavy trucks, cost of maintenance, need for new turn lanes and signals (2)
- Evaluate project-related truck and other traffic and impacts on roads; traffic circulation and controls; transportation systems (roads, highways, rail lines); safety routes; safety of routes used to transport firefighting equipment; access alternatives; pedestrians and bicyclists; school buses; vehicular safety overall and from truck traffic; during day and nighttime hours; economic impacts on road and bridge maintenance and repair (15)
- Evaluate the positive impacts of reduced truck tanker traffic on highways because of the pipeline and associated reduction in impacts from spills (2)
- Detailed, site-specific information needs to be provided about mitigation measures, including roadway realignment, reconfiguration, size reduction, use of pilings rather than fill, road safety devices to meet road safety objectives, maintenance road access (4)

2.20 Aesthetics

- Provide photosimulations of conditions before and after construction for pump station locations, the pipeline hung from bridges, from nearby roadways and residences (2)
- Evaluate impacts to aesthetics overall (scenic rural and forest character); impacts of facilities (pump stations, block valves, concrete-coated pipeline hung from wooden bridges); from riparian area disturbance; relocation of roads; altered buffers and effectiveness of buffers; include photosimulations before, during, and after construction; effect of designation sign posts along the route; light and glare impacts; visual impacts of spills; impacts to various users (residents, recreationists) (12)
- Show how visual impacts will be minimized (scarring); use of natural screening, buffers, and berms (3)

2.21 Recreation

- Provide detailed information about current campground usage
- Provide more detailed description and maps showing where the pipeline is located on recreational trail segments and the length of the pipeline route within trail boundaries; a schedule of planned closures of recreational facilities during construction; permissions and permits that have been obtained to use recreational lands
- Evaluate in detail the construction and maintenance/operation impacts to recreation in general; on national forests and state parks; on the Cross State Trail (Iron Horse State Park, John Wayne Pioneer Trail), Cedar Falls Trail, and two private golf courses (Echo Falls Country Club and Mount Si Golf Course); temporary use of campgrounds by construction workers for lodging during the heaviest use period (summer); difficulties of constructing pipeline in the Snoqualmie Pass Tunnel; effects of exposure of pipeline and minimal corridor width through Snoqualmie Pass Tunnel on equestrians, covered wagon use, and mountain bicyclists; impacts of construction and spills on sport fishing; potential interconnection of route with trail system (10)
- Identify mitigation measures, including reducing the impacts to the Cross State Trail; compensating State Parks for patrolling the corridor, maintenance, and operation; for Crystal Sno-Park (4)
- Develop a management plan for shared use of the Cross State Trail

2.22 Agriculture

- Describe in detail the crops that are grown with the proposed corridor, soils and prime farmlands
- Evaluate impacts to agriculture (farmland and rangeland), including livestock access; feeding; watering stations; farm equipment operations; soil compaction; microorganisms in the soil; soil temperature changes; irrigation canals from contamination or operation/maintenance; damage to newly planted and established fields; subsequent ability to make affected farmland productive again; spill contamination of fruits, vegetables, crops, and animals; indirect impacts of promoting conversion of farmlands to urban or industrial lands (19)
- Evaluate resource management compatibility of the project with agricultural districts, demonstrate avoidance of crossing agricultural lands (2)
- Construction should occur during the non-irrigation season (November through February)
- Describe mitigation and compensation measures for impacts to agriculture, for impacts to irrigation canals, special construction or engineering methods that would be used for mitigation (3)

2.23 Public Services and Utilities

- Identify potable water sources for the operational phase of the project; location and capacity of water lines; routing of water and sewer service lines to pump stations; availability and capacity of sewer connections and/or feasibility of onsite wastewater treatment systems for three pump stations
- Evaluate the current service levels for emergency response services (police, fire, ambulance, medical, hazardous materials response), including personnel, physical plants, and equipment (5)
- Evaluate the impacts on utilities (sewer and water lines, solid waste management), mainline connections, utility development and maintenance, infrastructure development compensation, the proposed fiber optic cable (7)
- Evaluate the impacts of fires, explosions, spills, and accidents on emergency response services (police, fire, ambulance, medical, hazardous materials response), including capabilities, personnel, physical plants, equipment, and funding (8)
- Discuss proper storage and disposal of solid or hazardous wastes, use best management practices

- Describe mitigation measures for impacts on public services
- Prepare a wastewater discharge plan, detailed emergency response plan (including training, human resources available, equipment, where resources are located, response times, size of spill that would trigger a response, where booms would be used, containment techniques for specific types of pipeline segments and affected areas, effectiveness of measures, evacuation conditions, difficulties of deploying during bad weather, and water flow rates) (3)

2.24 Socioeconomics

- Provide cost estimates for land and right-of-way acquisition, permitting, and pre-construction studies; include ranges or uncertainty cost factors for all project costs; reevaluate socioeconomic impacts once these additional factors have been taken into account; cost comparison of the alternatives (2)
- Evaluate in detail the economic impacts of damages to fish and wildlife; on job development; on communities/businesses providing goods and services to users of fish and wildlife resources; indirectly induced increased growth rates for residential, commercial, and industrial purposes; economic development infrastructure; economic costs to landowners from spill damages; effects on property values and ability to sell lands; landowner payment of taxes on easement lands; medical costs from increased stress, pollution effects, and other hazards; effects of landowner legal and economic responsibility for cleaning up leaks; population densities; loss of jobs, income, and tax revenues from those involved in the current shipping process (barging) (28)
- Evaluate impacts on governmental revenues and costs, including maintaining roads (3)
- Evaluate the effects of an explosion and damages on area homes
- Evaluate impacts to the quality of life for residents, neighborhood character and cohesion (4)
- Evaluate the positive socioeconomic impacts of shifting to a non-barging mode of shipment that does not rely upon temporary closure of locks for maintenance, repair, or the need to meet fisheries mitigation flow levels; production of a more reliable source of fuel to the Tri-Cities; reduce need for dock and ship repair and support facilities; reduced highway operation and maintenance costs from less trucking; reduced taxpayer costs for spill cleanup; reduced economic impacts on commerce and agriculture from spills on the Columbia River; reduced costs of fuels (4)
- Describe mitigation and compensation for job development, economic development infrastructure for future business prospects, compensation for spill mitigation costs (5)

2.24 Historical and Cultural Resources

- Describe cultural resource sites in areas where the pipeline and facilities might be located; conduct a 100 percent survey; indicate timing of archival research of two historic sites in the Central Columbia Basin and subsurface testing of each isolated projectile point; indicate when consultation will occur with tribes for eligibility of peeled cedar isolates, sites of religious significance, resource areas of significance (2)
- Evaluate the preemption process and how it relates to tribal jurisdiction
- Discuss impacts on Native American trust lands and rights, Tribes Usual and Accustomed fishing areas, and other rights (2)
- Discuss impacts on traditional Native American uses of affected lands; show how impacts to significant historic, archaeological, and historic community character have been minimized; fishing resources, sites, and use (6)

2.26 Energy and Natural Resources

- Identify specific (rather than general or possible) sources of electricity for the pump stations, the Kittitas Terminal, and block valves, including where the tie-ins would be, transmission line routing, pole designs, power demands versus supplies (2)
- The project would result in an irretrievable commitment of natural resources, use and development of nonrenewable resources, lack of movement to sustainable/renewable energy source, lack of conservation (3)
- Evaluate the impacts of extraction of construction materials on the site, availability and use of electricity for block valves (3)

2.27 Cumulative Impacts

- Evaluate all proposed projects associated with or dependent upon the proposed pipeline, including future additions, expansions, or further activities on or contiguous to the site (6)
- Will the project lead to increased petroleum production in Washington? Has refinery production increased in the recent past? What is the projected increase in Washington refineries without the project? Which facilities will increase production? (4)

- Will there be an increase in importation of oil and tanker traffic to refineries through the Straits of Juan de Fuca? (8)
- Is there a connection between the project and the proposed Arlington Tank Farm project? (4)
- What is the possibility of the proposed project being expanded, or placing a second pipeline along the proposed pipeline at a later date? (4)
- Thoroughly analyze the cumulative impacts to water disruptions and deteriorations (quantity and quality)
- Will the pipeline preclude new construction or upgrade of existing facilities in the corridor?

3 PUBLIC SCOPING MEETINGS

Scoping meetings were held on six evenings in March 1996 to receive written and oral testimony. Land use testimony was also taken at these meetings but is the topic of another process. Land use consistency testimony is not discussed here.

Most comments were submitted in writing either by letter or by submitting a completed comment sheet, copies of which were available at each meeting. The general type and content of comments at each meeting are summarized here. Those oral comments which were followed by detailed letters, such as from the Washington Environmental Council, the Columbia Cascade Alliance, Counsel for the Environment, and others, are summarized in the written comments section of this document.

3.1 Mill Creek

- Comments were made on the project creating a demand for more oil production, tanker traffic, export and oil transport impacts of no action.
- Liability and who accepts it was an issue
- Numerous union members spoke in support of jobs
- Groundwater, wells, and the sole-source aquifer were big issues
- Noise and odor and public safety from pumps and storage tanks
- Creeping refinery expansion and the extent to which this project would increase it were of concern

3.2 North Bend

- Concerns about water crossings; floodplains and potential spills
- Floodplains and their effect on the line or bridges used to hold the line
- Municipal water supply
- Alternative routes to avoid water supply areas

3.3 Ellensburg/Kittitas

- Traffic accidents by the terminal interchange
- Air monitoring - no stations in county
- Soil productivity; impacts on farming
- Recreation on the trails
- Liability
- Tank farm fire
- Numerous union member comments on jobs

3.4 Royal City

- There was very little comment overall; it was dominated by union members supporting the line to protect jobs
- Air quality emissions if not built; spill from existing systems
- Weed control is needed on the ROW
- Concern about Crab Creek
- Barges leak and may not be able to operate in the future if the rivers are lowered through drawdown

3.5 Pasco

- Union comments in support of barges
- Union comments in support of pipelines
- Spill risk
- Farming impacts
- Potential for competition with other lines; alternatives

3.6 Othello

- Union comments in support of pipelines
- Property values
- Farming impacts
- Land use and spill issues

■ Oil supply/demand